

Acres Burned-Seven Biggest Seasons

2017 – 1,551,275

2012 – 1,497,972

2006 – 1,201,117

2007 – 1,185,199

2000 – 1,087,920

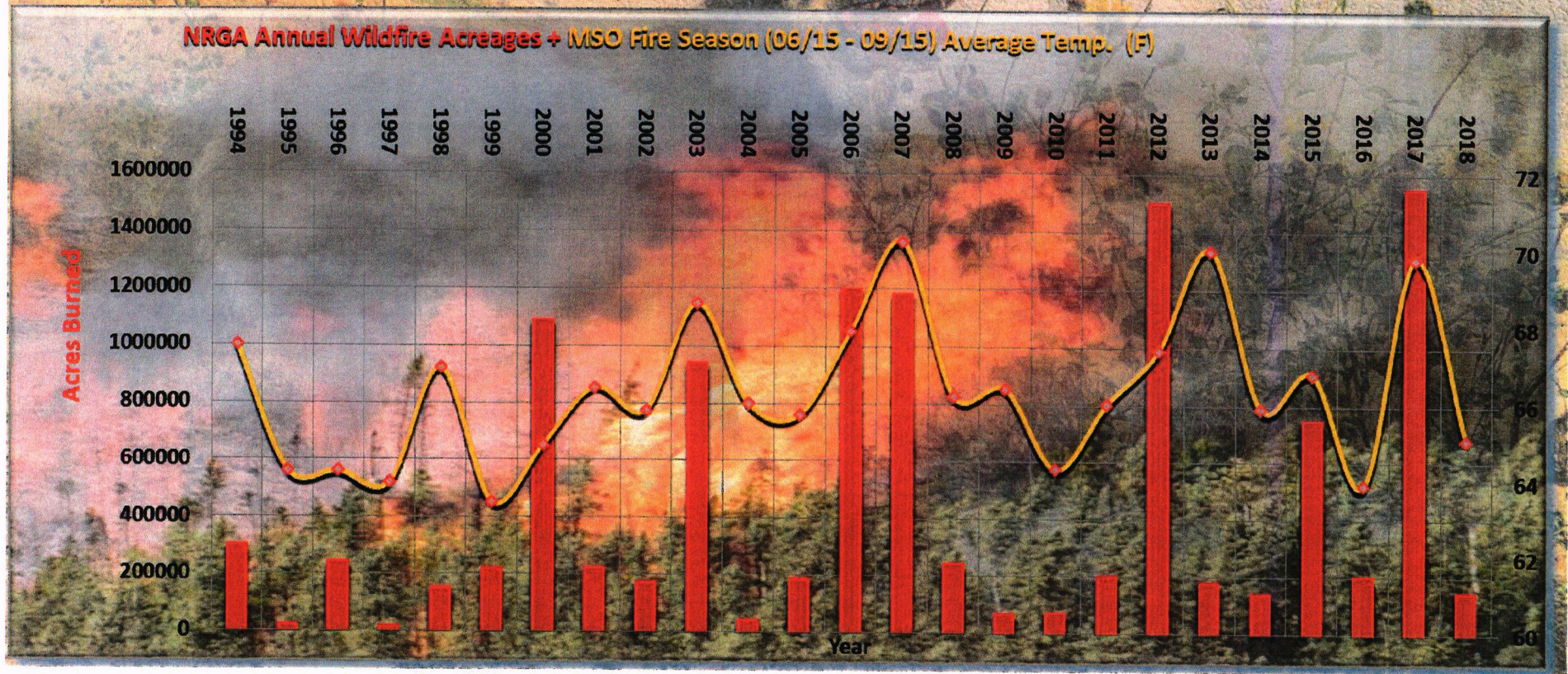
2003 – 942,022

2015 – 745,947

WATER POLICY INTERIM
COMMITTEE 2019-20

June 10, 2019

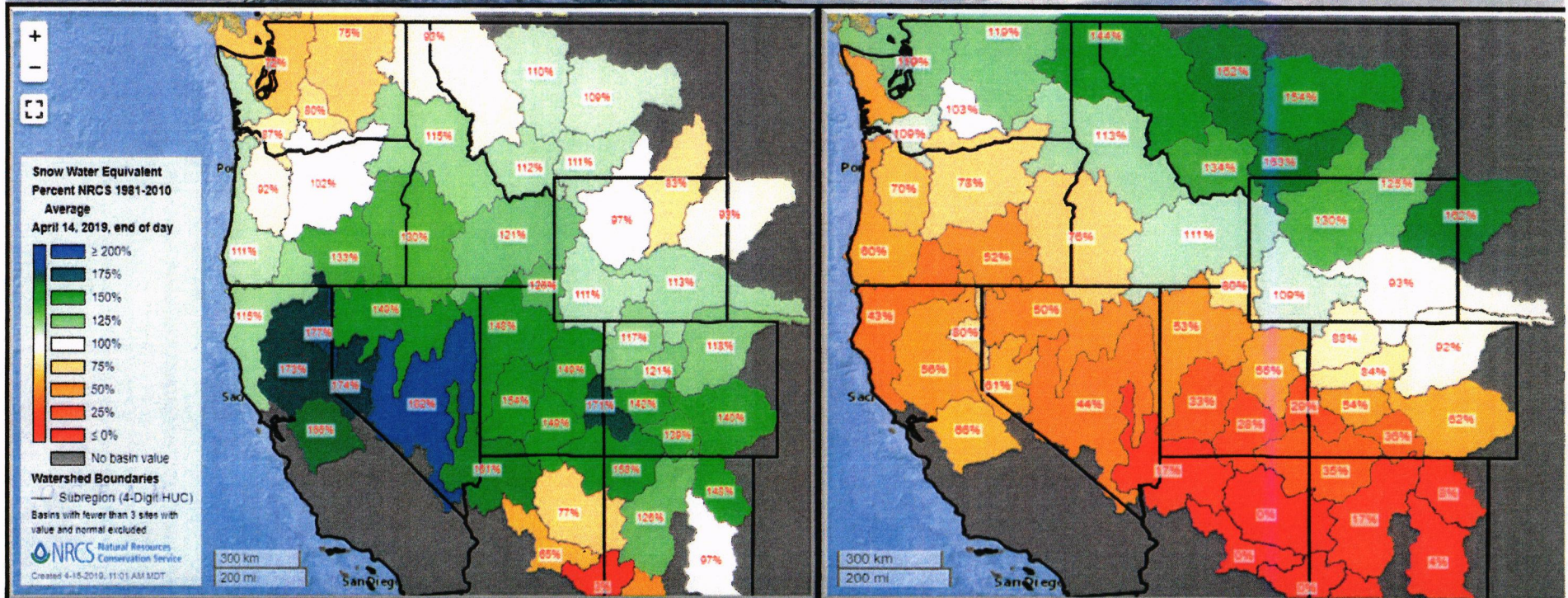
Exhibit 13



Seasonal Trends – Water Year Snowpack

NRCS SNOTEL BASIN-AVERAGE SWE

*El Nino-Like Pattern: Below average North Idaho (and PacNW)
Reversal of pattern from last winter*

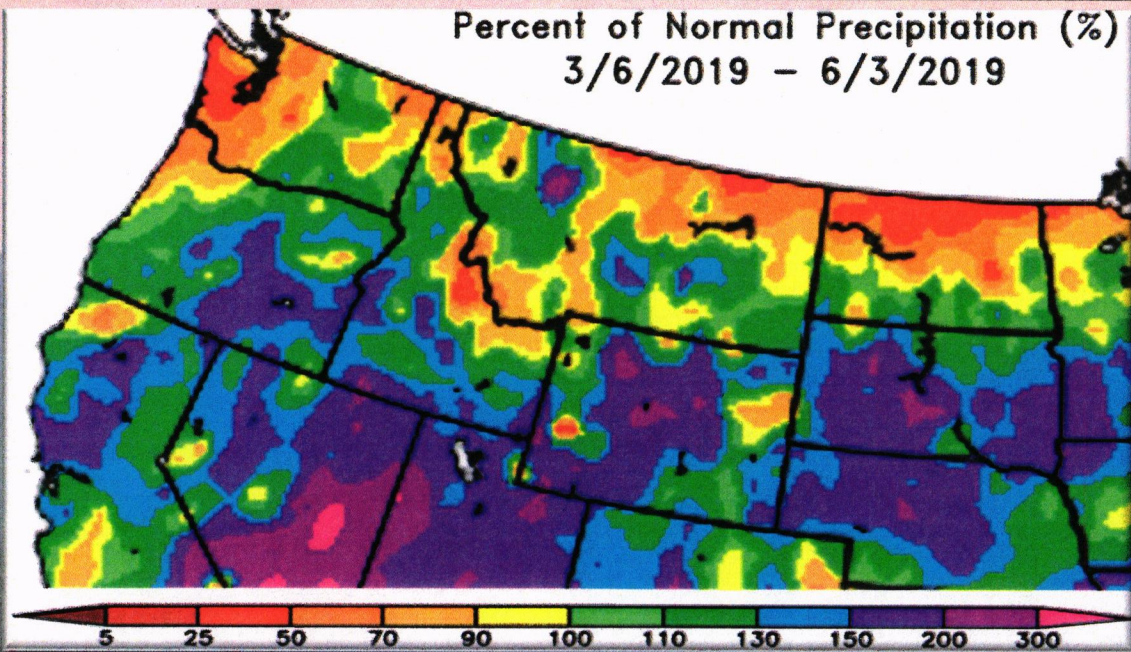


April 2019

April 2018

90-Day Trends

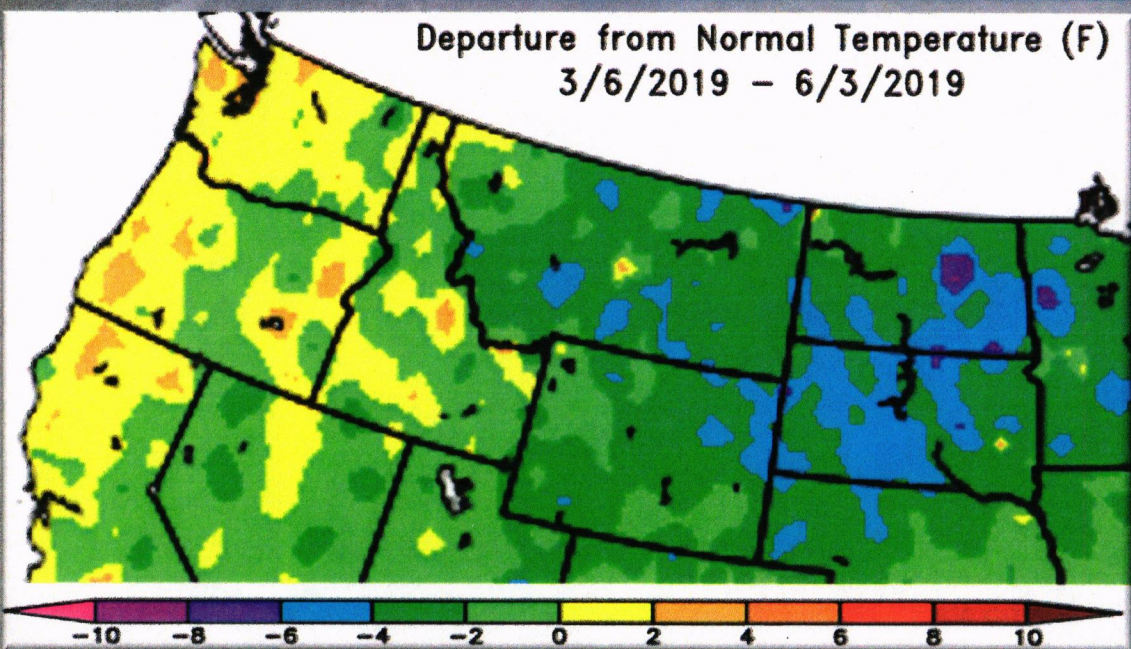
Percent of Normal Precipitation (%)
3/6/2019 – 6/3/2019



DRY: North ID, N-Central/NE MT and Northern ND

WET: W-Central MT, Along Continental Divide, and S-Central/SE MT, Southern Third ND

Departure from Normal Temperature (F)
3/6/2019 – 6/3/2019



Near-Average Temps. North ID and Western MT.

Colder than Average East of The Continental Divide in MT and all of North Dakota.

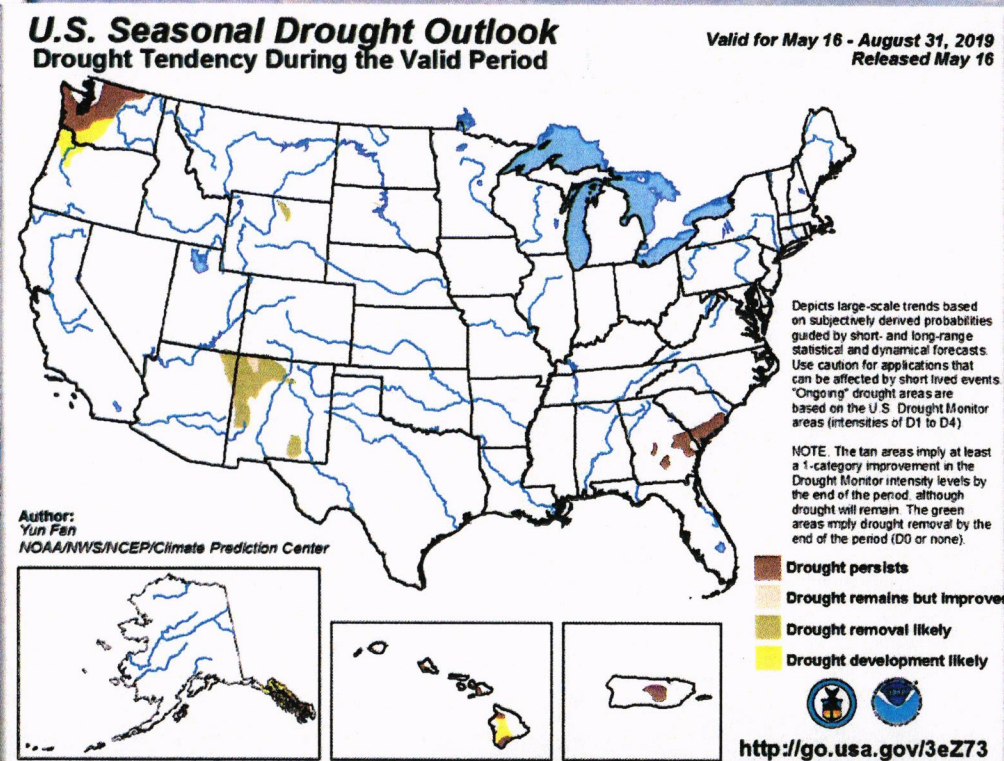
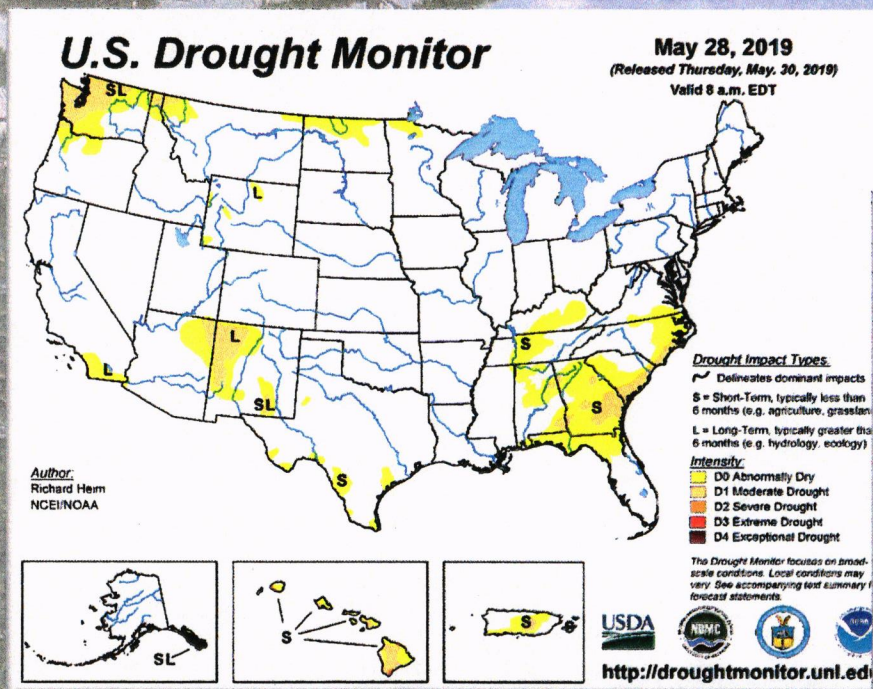
Drought Status, Outlook:

Current Status:

Moderate Drought

North ID and NW MT (PSAs 01/02)

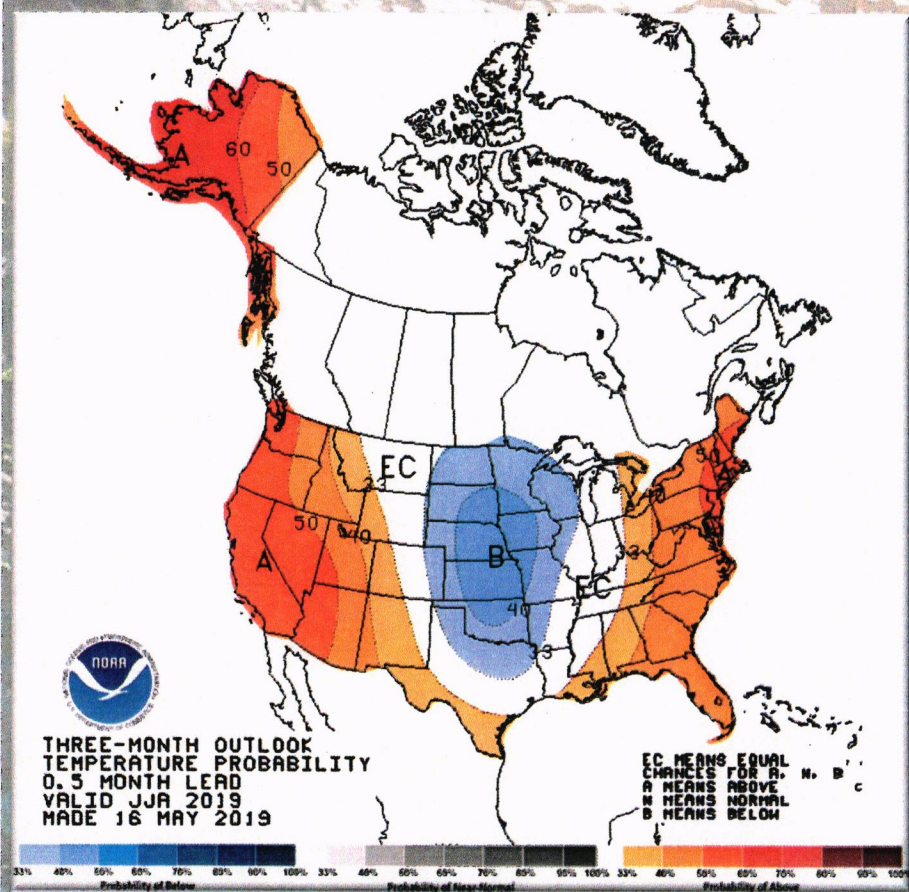
Outlook Through August: No Drought for NRGAs



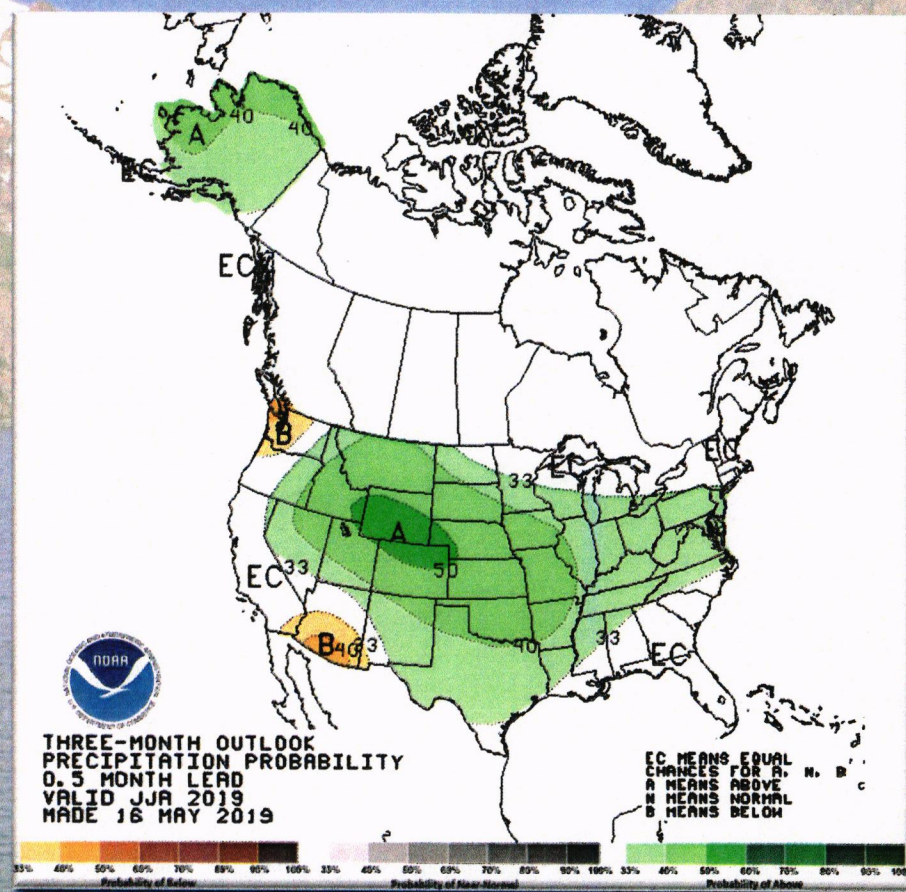
NOAA/NWS Climate Prediction Center

Temperature and Precipitation Anomaly Outlooks

June, July and August



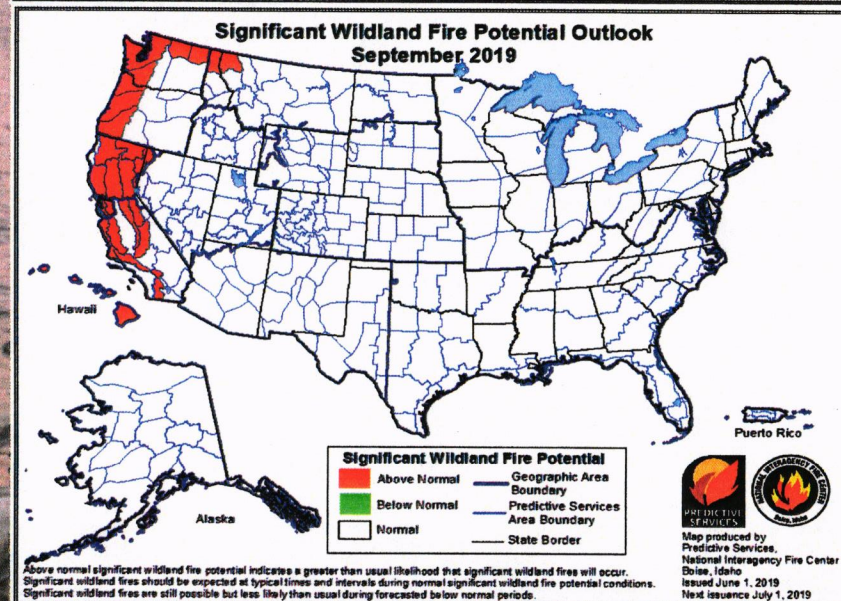
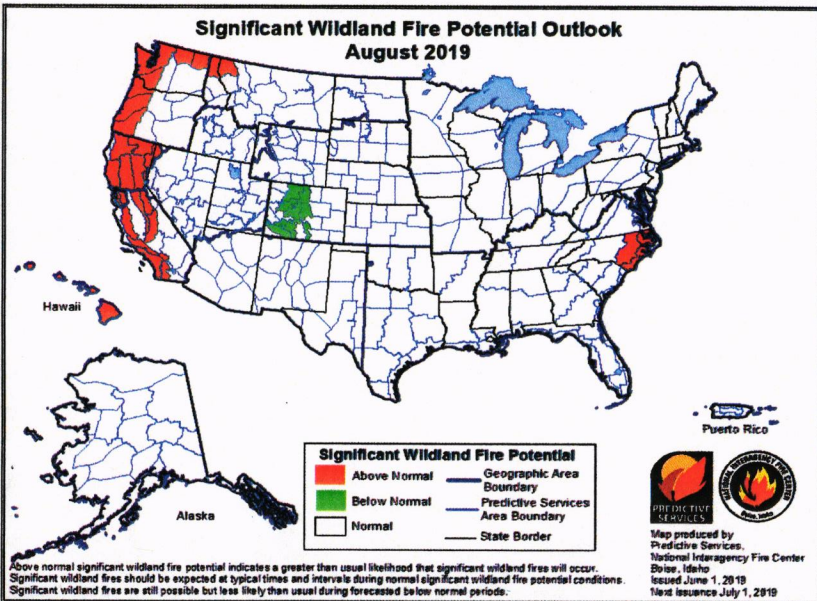
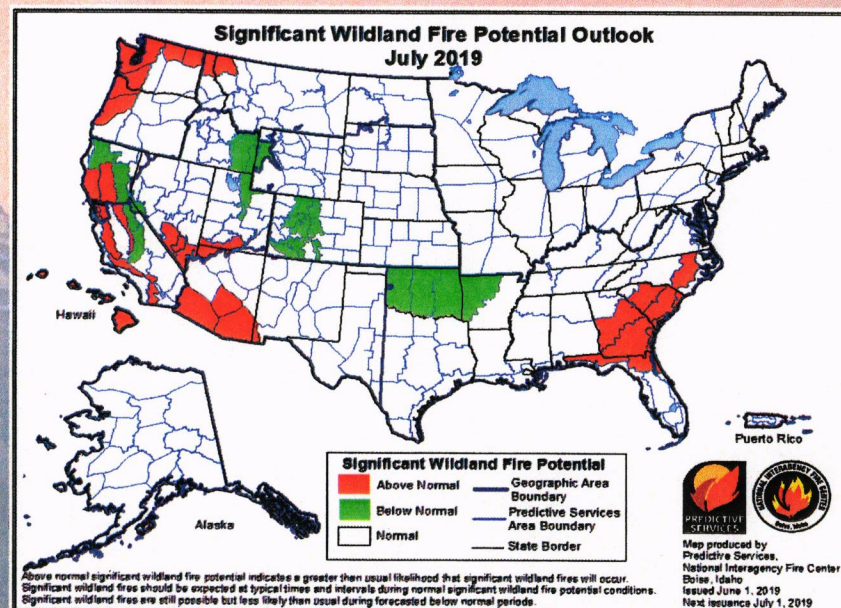
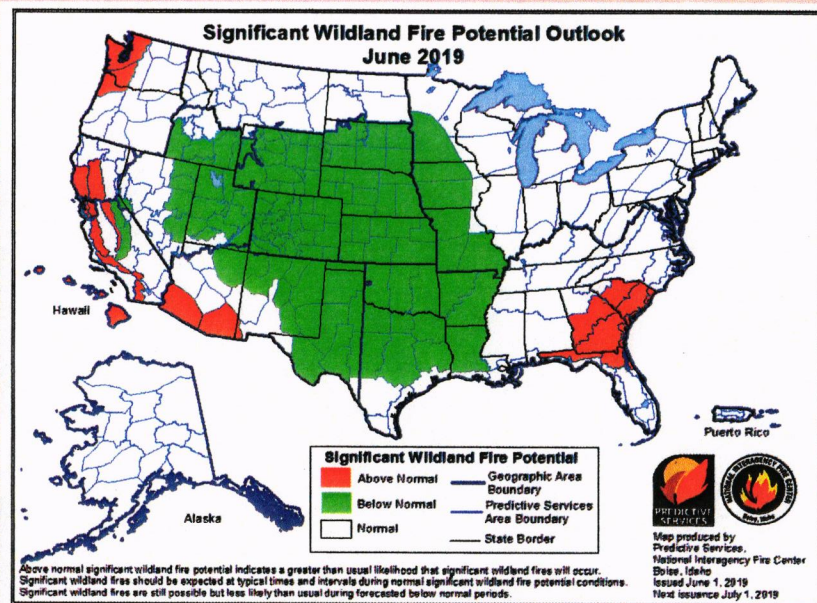
Above Average Temps Western US.
Including North ID/Western MT



Moister than Average Probability Focused
On most of Montana/Western ND

June: Normal all PSAs (green-up)

July/August/September: Increasing to and remaining Above Normal in Far North ID/NW MT (PSAs 01/02), Normal elsewhere



Overall Increase in Wildland Fire in the Western U.S., Fire Seasons 78 Days Longer on Average Since 1970

NRGA Trend Matches This

"Anthropogenic climate change accounted for ~55% of observed increases in fuel aridity from 1979 to 2015 across western US forests, highlighting both anthropogenic climate change and natural climate variability as important contributors to increased wildfire potential in recent decades."

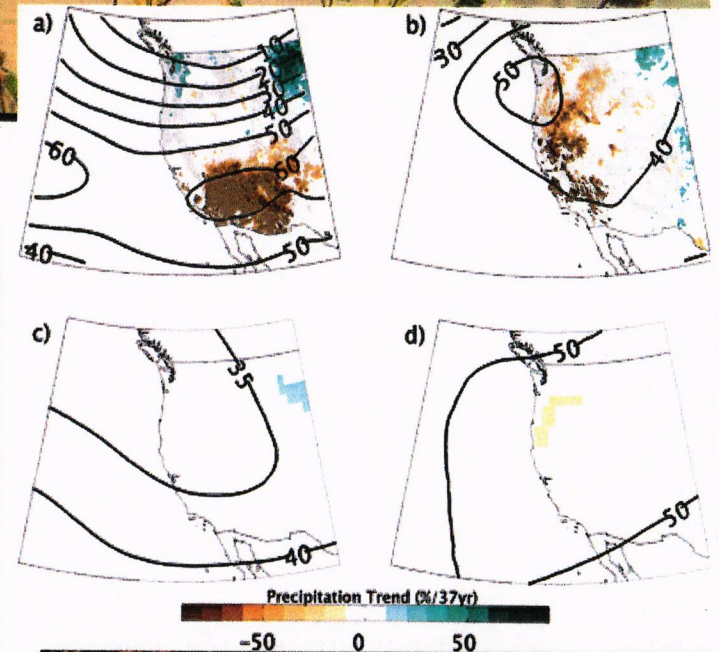
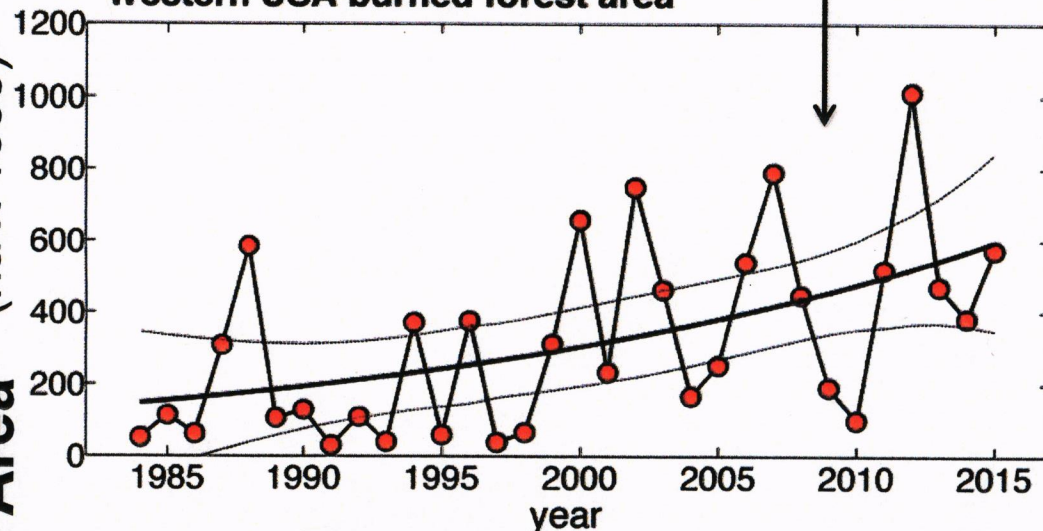
Trend in Spring/Summer Jet Stream. Weaker Low Pressure Troughs/**Stronger Ridging**.



+4.6% per year

Annual Forest-Fire Area (ha x 1000)

Western USA burned forest area



Williams & Abatzoglou (2016)
Current Climate Change Reports